

REMARKS

This Amendment and Response to Non-Final Office Action is being submitted in response to the non-final Office Action mailed July 26, 2005. Claims 20-38 are pending in the Application. Claims 20-23 and 25-38 stand rejected. Specifically, Claims 27-36 stand rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which Applicants regard as the invention. Claims 20, 21, 26, 27, and 36 stand rejected under 35 U.S.C. 102(e) as being anticipated by Mueller (U.S. Patent No. 6,198,721). Claims 22, 23, 25, and 28 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Mueller in view of Latif et al. (U.S. Patent No. 6,400,730). Finally, Claims 37 and 38 stand objected to for containing informalities.

Claims 24 and 29-35 stand objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims and if the above rejection under 35 U.S.C. 112, second paragraph, is overcome.

In response to the above rejections and objections, Claims 20, 23, 25, 27, 30, and 33 have been amended to further clarify the subject matter which Applicants regard as the invention and Claims 22, 24, 29, 37, and 38 have been canceled, without prejudice or disclaimer to continued examination on the merits. These amendments are fully supported in the Specification, Drawings, and Claims of the Application and no new matter has been added. Based upon the amendments, reconsideration of the Application is respectfully requested in view of the following remarks.

Objection to Claims 37 and 38 for Containing Informalities:

Claims 37 and 38 stand objected to for containing informalities.

In response to this objection, Claims 37 and 38 have been canceled, as they were intended to depend from previously-canceled Claims 2 and 13, respectively. Previously-canceled Claims 2 and 13 are the subject of the parent of the present divisional Application.

Therefore, Applicants submit that the objection to Claims 37 and 38 for containing informalities is now moot.

Rejection of Claims 27-36 Under 35 U.S.C. 112, second paragraph:

Claims 27-36 stand rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which Applicants regard as the invention.

Specifically, Examiner indicates that “the redundant signal paths” of Claim 27 is without antecedent basis, “the multiplexing unit” of Claim 27 is without antecedent basis, and “the multiplexer device” of Claim 33 is without antecedent basis.

In response to this rejection, “the redundant signal paths” of Claim 27 has been changed to “the redundant data paths”, “the multiplexing unit” of Claim 27 has been changed to “the multiplexing device”, and “the multiplexer device” of Claim 33 has been changed to “the multiplexing device”, all of which have proper antecedent basis.

Therefore, Applicants submit that the rejection of Claims 27-36 under 35 U.S.C. 112, second paragraph, has now been overcome and respectfully request that this rejection be withdrawn.

Rejection of Claims 20, 21, 26, 27, and 36 Under 35 U.S.C. 102(e) - Mueller:

Claims 20, 21, 26, 27, and 36 stand rejected under 35 U.S.C. 102(e) as being anticipated by Mueller (U.S. Patent No. 6,198,721).

In response to this rejection, independent Claim 20 has been amended to recite all of the elements/limitations of objected to, but otherwise allowable, dependent Claim 24 (now canceled), as well as intervening dependent Claim 22 (also now canceled). Specifically, independent Claim 20 has been amended to recite:

20. (Currently Amended) A configuration for an optical fiber ring network, comprising:

two or more nodes, each node including,
a multiplexing device,
a client device, and

redundant signal connections between the multiplexing device and the client device;

redundant signal paths connecting the nodes, each of the redundant signal paths including an optical fiber link operable to transmit data bidirectionally between each pair of connected nodes,

wherein the multiplexing device is configured to selectively transmit outgoing data from the client device, and selectively receive incoming data destined for the client device, over each of the redundant signal paths, the multiplexing device being selectively linked to the client device for data communications by each of the redundant signal connections;

wherein the redundant signal connections include,

first and second link cards, each operable to communicate data between the multiplexing device and the client device, and

a switching apparatus operable to activate one of the first and second link cards, wherein

the activated link card conveys the outgoing data from the client device to the multiplexing device, and conveys the incoming data from the multiplexing device to the client device; and

wherein

the redundant data paths include a first and second data path,

the multiplexing device includes a first and a second multiplexing unit configured to transmit the outgoing data and receive the incoming data over the first and second signal path, respectively, and

the activated link card selectively links the client device to each of the first and second multiplexing units for data communications.

Likewise, independent Claim 27 has been amended to recite all of the elements/limitations of objected to, but otherwise allowable, dependent Claim 29 (now canceled). Specifically, independent Claim 27 has been amended to recite:

27. (Currently Amended) An apparatus for use at a node of an optical fiber ring network, comprising:

redundant data paths each including an optical fiber link operable to transmit data bi-directionally between the node and another node in the network;

a multiplexing device configured to selectively transmit outgoing data from a client device, and selectively receive incoming data destined for the client device, over each of the redundant data paths, the multiplexing device being selectively linked to the client device for data communications by redundant signal connections,

wherein the multiplexing device is operable to selectively transmit and receive the incoming and outgoing data, respectively, according to Fibre Channel (FC) protocol; and

wherein

the redundant data paths include a first and a second data path,

the multiplexing device includes a first and second multiplexing unit configured to transmit the outgoing data and receive the incoming data over the first and second signal path, respectively, and

the activated link card selectively links the client device to each of the first and second multiplexing units for data communications.

Therefore, Applicants submit that independent Claims 20 and 27, as well as pending dependent Claims 21, 23, 25, 26, 28, and 30-36, are now in condition for allowance.

Rejection of Claims 22, 23, 25, and 28 Under 35 U.S.C. 103(a) - Mueller and Latif et al.:

Claims 22, 23, 25, and 28 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Mueller in view of Latif et al. (U.S. Patent No. 6,400,730).

The above arguments apply with equal force here.

CONCLUSION

Applicants would like to thank Examiner for the attention and consideration accorded the present Application. Should Examiner determine that any further action is necessary to place the Application in condition for allowance, Examiner is encouraged to contact undersigned Counsel at the telephone number, facsimile number, address, or email address provided below. It is not believed that any fees for additional claims, extensions of time, or the like are required beyond those that may otherwise be indicated in the documents accompanying this paper. However, if such additional fees are required, Examiner is encouraged to notify undersigned Counsel at Examiner's earliest convenience.

Respectfully submitted,

Date: October 26, 2005



Christopher L. Bernard
Registration No.: 48,234
Attorney for Applicants

DOUGHERTY, CLEMENTS, HOFER, BERNARD & WALKER
1901 Roxborough Road, Suite 300
Charlotte, North Carolina 28211 USA
Telephone: 704.366.6642
Facsimile: 704.366.9744
cbernard@worldpatents.com